

1 **Amendment to the Claims**

2
3 **In the Claims:**

4 Please amend Claims 1, 5, and 10 as follows:

5 1. (Currently Amended) A method for measuring molecular movement in a cell,
6 comprising:

7 contacting a cell with a compartment marker and with a molecular marker[.];
8 imaging the marked cell with a detector[.];

9 creating a compartment mask[.]; and
10 [correlate] correlating said compartment mask and said molecular marker to measure
11 molecular movement in a cell.

12 2. (Original) The method of claim 1 wherein there is relative motion between the cell and the
13 detector.

14 3. (Original) The method of claim 1 wherein the molecular marker is a fluorescent labeled
15 antibody.

16 4. (Original) The method of claim 1 wherein the compartment marker is a fluorescent
17 molecule.

18 5. (Currently Amended) The method of claim 1 wherein the compartment marker is a
19 nucleus, cytoplasm, or a membrane.

20 6. (Original) The method of claim 1 wherein the molecule marked is NF- κ B.

21 7. (Original) The method of claim 1 further comprising the step of inducing molecular
22 movement in the cell.

23 8. (Original) The method of claim 7 wherein the induced molecular movement is nuclear
24 translocation.

25 9. (Original) The method of claim 7 wherein the molecular movement is induced with LPS
26 or IL-1 β /TNF- α .

10. (Currently Amended) A method for measuring nuclear translocation in a cell, comprising:

contacting a cell with a nuclear marker and with a molecular marker[.];
imaging the marked cell with a detector, creating a nuclear mask[.]; and
~~correlate~~ correlating said nuclear mask and said molecular marker to measure molecular movement in a cell.

11. (Original) The method of claim 10 wherein there is relative motion between the cell and the detector.

12. (Original) The method of claim 10 further comprising the step of inducing molecular movement in the cell.

13. (Original) The method of claim 12 wherein the induced molecular movement is nuclear translocation.

14. (Original) The method of claim 12 wherein the molecular movement is induced with LPS or IL-1 β /TNF- α .

15. (Original) The method of claim 10 wherein the nuclear marker is 7-AAD.

16. (Original) The method of claim 10 wherein the molecule marked is NF- κ B.

17. (Original) The method according to any one of claims 1-16 wherein the images are collected simultaneously.

18. (Original) The method according to any one of claims 1-16 wherein the detector is a time delay integration charge-coupled detector.